

## **ABSTRACT**

Effect of Cisatracurium, Rocuronium pretreatment on Succinylcholine-Induced Fasciculations and Myalgia: A Comparison with Placebo, double blind randomised control study

### **OBJECTIVE:**

To study the effect of pretreatment of Cisatracurium, Rocuronium on succinylcholine induced muscle fasciculation and post operative myalgia in patients undergoing ambulatory surgery.

**DESIGN:** Randomised double blind, placebo controlled trial

**SETTING:** Teaching Hospital

**SUBJECTS:** 150 ASA Physical status I and II Patients scheduled for elective g surgery under general anesthesia

**INTERVENTION:** A standardized balanced anaesthetic technique was used for all patients.

### **MEASUREMENTS AND MAIN RESULTS;**

Patients were randomised to receive cisatracurium 0.01mg/kg, rocuronium 0.06mg/kg, or saline 3 minutes prior to intravenous succinyl choline 1.5 mg/kg. The intensity of fasciculation was assessed using a four point rating scale. In addition the severity of myalgia was assessed using a four point rating scale in the post anaesthesia care unit and at 24 hrs post operatively. No patient

complained of any side effects after the administration of the study drug. Fasciculations were observed less frequently ( $P < 0.05$ ) in the rocuronium group compared with cisatracurium and saline. Although fasciculation occurred less frequently in the cisatracurium group than in the placebo group, this difference did not reach statistical significance. Incidence of Post operative myalgia were observed less frequently in the rocuronium group compared with that of cisatracurium and placebo group.

## **CONCLUSION:**

Pretreatment with rocuronium was superior to cisatracurium in preventing succinyl choline induced muscle fasciculation and also the incidence of post operative myalgia.

**Keywords:** Neuromuscular non depolarising blockade drugs: cisatracurium, Rocuronium, succinyl choline: side effects fasciculation, myalgia